

BRUHAT BANGALORE MAHANAGARA PALIKE
YELAHANKA ZONE

Estimate Cost Rs. 10000000.00

Name of Work: Detailed Estimate for the work of Improvements to roads and drains at B sector main and cross roads in ward no - 04.

Sl No	Description of Item	Unit	No	L	B	D	Qty	Rate	Amount
1	KSRRB 300-1,Earth work excavation by manual means in ordinary soil involving an average horizontal throw up to 2 meters and an average lift up to 1.5m,excavated surface levelled and sides neatly dressed, the disposed earth to be levelled neatly after breaking of clods complete as per specifications (Item no19.1,Page no142, PWD SR 2018-19)	cum							
	for RCC drain								
	15th B main road LHS		1	300.00	1.20	1.00	360.00		
	RHS		1	295.00	1.20	1.00	354.00		
	4th B main road RHS		1	60.00	1.20	1.00	72.00		
	LHS		1	45.00	1.20	1.00	54.00		
	culvert		2	9.00	1.80	1.20	38.88		
	for road edge						0.00		
			4	155.00	2.00	0.20	248.00		
			1	100.00	2.00	0.20	40.00		
	burm cutting		4	81.50	0.60	0.20	39.12		
							1206.00	137.80	166187.00
	Basic Rate	130.00							
	Area Weightage 6%	7.80							
	Grand Total	137.80							
2	KSRB 100-1 Loading and unloading of stone aggregates / sand/ kanker/ Moorum /soil KSRRB M100-1 Placing tipper at loading with front end loader dumping turning for return trip excluding time for haulage and return trip complete as per specification item No 17.1 page 130 and KSRB M.100.4.1 cost of haulage excluding loading and unloading MORTH to a distance of 4.00 K.M (Item No 17.4 Page 134 (SR 2018-19)	cum							
							1206.00	82.13	99047.00
	Basic Rate for loading and unloading	57.00							
	Basic Rate for Haulage upto 8.00 k.m =1.28 X 2.50 X 8	20.48							
	Basic Rate	77.48							
	Area Weightage 6%	4.65							
	Grand Total	82.13							

Sl No	Description of Item	Unit	No	L	B	D	Qty	Rate	Amount
3	KSRB 4-1.2: Providing and laying in position plain cement concrete of mix 1:3:6 with OPC @ 220kgs, with 40mm nominal size mechanically mixed, placed in foundation and compacted by vibration including curing for 14 days complete as per specifications, MORTH specifications No. 408, (P No.13, I No.4-1.2 of PW,P&I WTD S.R 2018-19)	Cum							
	for RCC drain								
	15th B main road LHS		1	300.00	1.20	0.15	54.00		
	RHS		1	295.00	1.20	0.15	53.10		
	4th B main road RHS		1	60.00	1.00	0.15	9.00		
	LHS		1	45.00	1.00	0.15	6.75		
	culvert		2	9.00	1.50	0.15	4.05		
	Basic Rate	5115.00					126.90	5421.90	688039.00
	Area Weightage 6%	306.90							
	Grand Total	5421.90							
4	Providing and laying Plain /reinforced cement concrete for side drains using M20 nominal mix concrete with OPC cement at 300kg with 20mm and down size granite metal coarse aggregate at 0.69 cum and fine aggregate at 0.43 cum machine mixed well compacted for walls at bottom including centring shuttering cost of materials HOM of machineries curing etc.completeexcluding cost of steel as per MORTH specification No.1500,1700,2200 Page No 265 Ite mo 37.59.2 SR 2018-19	Cum							
	15th B main road LHS		1	300.00	0.90	0.15	40.50		
	RHS		1	295.00	0.90	0.15	39.83		
	4th B main road RHS		1	60.00	0.90	0.15	8.10		
	LHS		1	45.00	0.90	0.15	6.08		
	culvert		2	9.00	1.50	0.30	8.10		
							0.00		
	Side walls		2	300.00	0.15	0.90	81.00		
			2	295.00	0.15	0.90	79.65		
			2	60.00	0.15	0.90	16.20		
			2	45.00	0.15	0.90	12.15		
	culvert	2x2	4	9.00	0.30	1.20	12.96		
							303.90	7070.20	2148634.00
	Basic Rate	6670.00							
	Area Weightage 6%	400.20							
	Grand Total	7070.20							

No	Description of item	Unit	No	L	B	D	Qty	Rate	Amount
5	KSRRB - 4.9.2 Providing TMT steel reinforcement for R.C.C work including straightening, cutting, bending, hooking, palcing in position, lapping and / or welding wherever required, tying with binding wire and anchoring to the adjoining memebtrs wherever necessary complete as per design (laps, hooks and wastage shall not be measured and paid) cost of materials, labour, HOM of machinery complete as per specification (I No 28.8 2 P No 229)	Tonne							
	for RCC drains 63 kg/cum		0.063	282.84			17.82		
	for culvert 80 kg/cum		0.080	21.06			1.68		
				303.90			19.09	72326.98	1380650.00
	Basic Rate	68233.00							
	Area Weightage 6%	4093.98							
	Grand Total	72326.98							
6	RCC Precast covering slab for drain (10cm thick)	sqm							
	15th B main road LHS		1	300.00	0.90		270.00		
	RHS		1	195.00	0.90		175.50		
	4th B main road RHS		1	60.00	0.90		54.00		
	missing slabs		1	19.50	0.90		17.50		
							517.00	2337.00	1208229.00
	Rate Approved by BBMP	2337.00							
7	Providing precast slab of 250 mm thick including cost of all materials, labour, curing, transportation, loading, unloading, etc., complete as per the direction of engineer in charge-	sqm							
			24	1.50	0.60		21.60		
							21.60	5418.00	117028.80
	Data Rate	5418.00							
8	KSRRB M400- Wet Mix Macadam - KSRRB M400-17. Providing, laying, spreading and compacting graded stones aggregate to wet mix macadam specifications including pre mixing the material with water at OMC in mechanical mix plant carriage of mixed method of tipper to site, laying in uniform layers with paver in sub-base/base course on well prepared surface and compacting with vibratory roller to achieve the desired density complete as per specifications. MORTH Specification No. 406 (P.No.158 I.No.20.18) Sr 2018-19	Cum							
			2	382.00	1.80	0.20	275.04		
							275.04	2001.28	550432.00
	Basic Rate	1888.00							
	Area Weightage 6%	113.28							
	Grand Total	2001.28							

Sl No	Description of item	Unit	No	L	B	D	Qty	Rate	Amount
7	Providing and applying primer coat with ss bitumen emulsion on prepared surface of granular base such as WMM including clearing of road surface and spraying primer at the rate of 0.60 kg/sqm using mechanical means complete as per specifications. MORTH Specification No.502 (P.No.160/lt No.21.6) SR 2018-19	sqm							
			2	382.00	1.80		1375.20		
							1375.20	36.04	49562.00
	Basic Rate	34.00							
	Area Weightage 6%	2.04							
	Grand Total	36.04							
8	KSRRB: 500-2 : Cleaning the existing black topped surface with brooms, soft brushes and finally dusting with old gunny bags and /or compressed air to recieve bituminous treatment including cost of all materials, labour, HOM of machineries complete as per Specifications. (P.No.157 & I.No.21.2) KPWD SR 2018-19	Sqm							
			1	155.00	6.80		1054.00		
			1	150.00	6.88		1032.00		
			1	100.00	6.60		660.00		
							2746.00	5.30	14554.00
	Basic Rate	5.00							
	Area Weightage 6%	0.30							
	Grand Total	5.30							
9	KSRRB M500-17. Providing and laying dense graded bituminous macadam using crushed aggregates of specified grading, premixed with VG30 grade bituminous binder and, transporting the hot mix to work site, laying to the required grade, level and alignment, rolling with smooth wheeled, vibratory and tandem rollers to achieve the desired compaction in all respects complete as per specifications. Clause 505 of MORTH V revision. - do - using 40/60 TPH capacity H.M.P. with Mechanical paver Gr-II (50 mm to 75 mm) with 4.5 % VG-30 Bitumen (P.No.160 lt.No.21.17.6) KPWD SR 2018-19								
			1	155.00	6.80	0.050	52.70		
			1	150.00	6.88	0.050	51.60		

SI No	Description of Item	Unit	No	L	B	D	Qty	Rate	Amount
			1	100.00	6.60	0.050	33.00		
	Basic Rate	7284.00					137.30	7721.04	1060099.00
	Area Weightage 6%	437.04							
	Grand Total	7721.04							
10	KSRRB 500-7. Providing and applying tack coat using 80/100 grade bitumen(VG10) on the prepared black topped surfaces at 2.5 kg per 10 sqm, heating bitumen in boiler fitted with spray set (excluding cleaning of road surface) including cost of all materials, labour, HOM complete as per specifications. Clause 503 of MORTH V revision. (P.No.158 & I.No 21.7) KPWD SR 2018-19	sqm							
			1	155.00	6.80		1054.00		
			1	150.00	6.88		1032.00		
			1	100.00	6.60		660.00		
							2746.00	14.84	40751.00
	Basic Rate	14.00							
	Area Weightage 6%	0.84							
	Grand Total	14.84							
11	KSRRB M500-19. Providing and laying bituminous concrete using crushed aggregates of specified grading, premixed with bituminous binder and filler, transporting the hot mix to work site, laying with a paver finisher to the required grade, level and alignment, rolling with smooth wheeled, vibratory and tandem rollers to achieve the desired compaction in all respects complete as per specifications. Clause 507 of MORTH V revision. - do - using 40/60 TPH capacity H.M.P. with Mechanical Paver Gr-II (30 mm to 40 mm) with 5.4% VG-30 Bitumen (P.No.162 Item No.21.22.6) KPWD SR 2018-19	cum							
			1	155.00	6.80	0.040	42.16		
			1	150.00	6.88	0.040	41.28		
			1	100.00	6.60	0.040	26.40		
							109.84	8980.32	986398.00
	Basic Rate	8472.00							
	Area Weightage 6%	508.32							
	Grand Total	8980.32							

Sl No	Description of item	Unit	No	L	B	D	Qty	Rate	Amount
12	KSRRB M800-13: Road marking with hot applied thermoplastic compound with reflect rising glass beads on bituminous surface- providing and laying of hot applied thermoplastic compound 2.5 mm thick including reflectorising glass beads at 250 gms per sqm area, thickness of 2.5 mm is exclusive of surface to level, uniform and free from streaks and holes complete as per specifications. MORTH specification No. 803, No. 1974 (P.No.185 & I.No.24.15)	sqm							
			2	155.00	0.10		31.00		
			2	150.00	0.10		30.00		
			2	100.00	0.10		20.00		
							81.00	454.74	36834.00
	Basic Rate	429.00							
	Area Weightage 6%	25.74							
	Grand Total	454.74							
							Total construction cost		8546444.80
							GST 12%		1025573.38
							PMC 1%		85464.45
							KRIDL Service charge 4%		341858

SI No	Description of Item	Unit	No	L	B	D	Qty	Rate	Amount
	Miscellaneous charges								1845.57
	Total								10000000.00

(Rupees Hundred Lakhs Only Only)

CERTIFICATE

- The work spot has been inspected and the work is found necessary.
- This estimate is prepared as per C.S.R. of 2018-19
- The provisions were made in this estimate are necessary and adequate.
- This works come under B.B.M.P limits.

Ramrajeev
Assistant Engineer

[Signature]
Assistant Executive Engineer

Yelahanka Satellite town Sub Division
Bangalore-64

[Signature]
Executive Engineer
Yelahanka Division
Bangalore-64

Administrative Sanction for Rs. 100.00 Lacs
Hundred Lakhs only,

is accorded under head P-3521
-2018-19

Registered as CE No. Subject
to conditions contained in enclosed memo

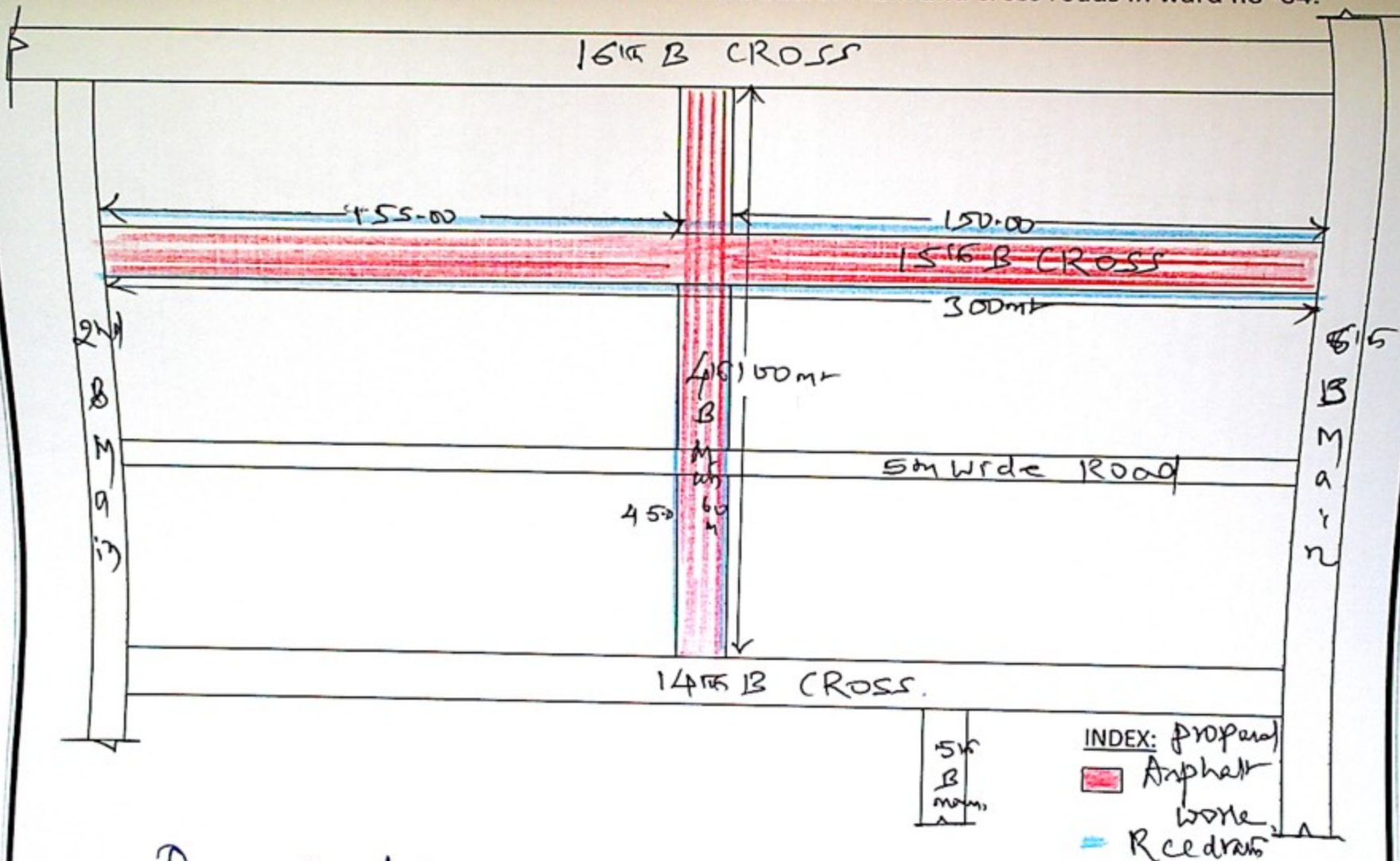
No. 1-1-AA/T#6/18-19 Dr. 2-3-19

[Signature]

Technical Sanction
Accorded For RS. 100.00 Lakhs only
Head of A/C P-3521
CER NO : 272 Dt. 02.03.19

[Signature]
TA **CE**

Name of work: Improvements to roads and drains at B Sector main and cross roads in ward no -04.



A.E. Ramrajewar, Az

A.E.E.